Living off the grid
near Wakefield

Living off-grid.

Sounds like you spend your time huddled around a flickering kerosene lamp hoping spring arrives soon. But the Anderson-Ménard family shattered that image during a visit to their 2,120-square-foot home near Low, Quebec, on a recent, brutally cold February afternoon.

Bright, open and warm enough that you’re comfortable in a T-shirt, the home is three kilometres from the nearest hydro line, so solar panels supply electricity for Craig Anderson, wife France-Pascale Ménard and their two-year-old son, Cedric.

A generator kicks in during long stretches of cloudy weather, and energy misers such as LED lights keep electricity consumption to a minimum.

On sunny days, the passive solar home warms quickly thanks to an expanse of south-facing windows in the open-concept kitchen/dining/living room overlooking the nearby Gatineau River.
The passive solar home warms quickly thanks to an expanse of south-facing windows in the open-concept kitchen/dining/living room. The home was designed by Anthony Mach of Ottawa's Mach Design and built by Wakefield-based Bala Structures.
And since the LEED* Gold-certified home is super-insulated (it has double exterior walls, for example, with an R-value of 47, more than double that of a conventional home), most of that heat stays where it belongs: inside the home, where the uncluttered decor and all that glazing urge your eye outward to the trees and bluffs and water of the rugged landscape.

“I love sitting in here and looking at the trees; it feels like you’re outside,” says Ménard, 35, gazing out the windows. “I had to have it hilly because I grew up in Quebec City. I’m used to rivers and lakes—that’s very important to me.”

The timelessness of the surrounding geography helped inspire the home’s design. That’s true of both its ageless blend of rustic and modern interior design and in the thinking behind the house itself, including construction features such as deep roof overhangs and cement board cladding that keep damaging water away from the structure.

“Every decision was long-term,” says Anderson, 37. “Everything is good enough quality so we’ll never regret the decision. If we’re successful, we won’t have any major maintenance until we’re very old.”

* LEED stands for Leadership in Energy and Environmental Design, an industry-recognized rating system for green homes and other structures. Gold is its second-highest level, and the Anderson-Ménard home is the first LEED Gold certified home in the Wakefield-Low area.
Maple flooring and a sloped birch veneer ceiling help tie the dining/living area together. The couple had made rough sketches of what they wanted before they even approached Mach.
The family bought their 100-acre property in 2011 and took possession of the home last summer. It was designed by Anthony Mach of Ottawa’s Mach Design and built by Wakefield-based Bala Structures (http://balastructures.com/) . For now, the family uses it mostly on weekends because they work in Ottawa, Anderson as a research coordinator at the University of Ottawa and Ménard as an analyst at Statistics Canada.

“France-Pascale and I have moved around a lot for the past 15 years but we’ve chosen to settle here,” says Anderson. “Even though we’re only here half the time, this is where the roots are going down.”

The design

With its jutting roofline, earth-toned cladding and windows that reflect its surrounding, the home is of a piece with the irregular Gatineau Hills.

Step inside, and the kitchen — the heart of a home — is the first main space. Dark slate on the floor and atop the island, soft green soapstone countertops elsewhere and maple cabinetry connect with the natural world outside.

Maple flooring and a sloped birch veneer ceiling help tie the dining/living area together while the screened-in porch at the far end of the home continues the woodsy theme with its fir and cedar interior. The porch is a favourite spot in the summer, says Anderson: “It’s only available for a few months of the year but it’s awfully nice. There’s a bit of breeze, you can see the sun set.”

Downstairs, pine timbers and the polished concrete floor create a restful feeling, and the master bedroom has a stunning view of the natural surroundings.
Anderson and his wife had made rough sketches of all this before they even approached Mach. “I had looked at thousands of pictures online,” he says.

Deep roof overhangs and cement board cladding keep damaging water away from the structure. ‘Every decision was long-term,’ says Anderson.
Dark slate on the kitchen floor and atop the island, soft green soapstone countertops elsewhere and maple cabinetry connect with the natural world outside. A rustic pine table that visually separates the kitchen and living room was made from an old barn on the property.

*Keeping powered up, warm and cool*

With a couple of upgrades yet to come, Anderson figures they will have spent about $20,000 on the solar panels and associated equipment.

The wood for the stove is from their own land, and the sun’s heat is free. The family pays to fill the large propane tank that heats the floors, runs the kitchen stove, and powers the tankless hot water heater.
In the summer the extended eaves, the wooden sunshades half-way up the south-facing windows and the mature trees help shield the home from the sun. There’s no air conditioning, and the main floor did get warm last August when the sunshades were less effective because the sun is lower in the sky, but Anderson says the lower level, with its concrete floor, remained cool.

Estimated total annual energy bills for the home are about $1,600, a low amount especially for a rural home exposed to the elements as urban homes are not.
Special touches

Those exterior sunshades are made of spaced lumber joined together by a massive steel rod bolted into the home’s frame. The construction allows light but not the sun’s rays to penetrate.

The family and guests eat at a large, rustic pine table that visually separates the kitchen and living room. It was made from an old barn on the property.

Wood from that barn and others also found its way into the rough-hewn barn door that slides open to reveal a large, walk-in pantry. Like the dining table, cabinetry and other wood work, the door was built by Bala.

To reduce visual busyness and downplay the walls’ thickness, there’s no interior window trim. In fact, the frame around the living room windows is sloped instead of being right-angled, softening the edge and drawing your eye toward the outside.

Life off-grid

With no television or, at least for the moment, Internet, the family spends a lot of time outdoors: cross-country skiing, hiking, swimming — what Anderson fondly calls the “silent sports.”

He’s doing the landscaping himself and has plans for an orchard and perhaps some cattle on a stretch of open land.

Anderson also plays guitar (not well, he insists), and the family now has the piano with which Ménard, who studied classical music for years, grew up. “My parents were getting rid of it, and we had room,” she says. “It’s something we’ve started doing, playing music as a family.”